Comparisons of Job Characteristics

Focus Occupation: Occupational Health and Safety Specialists (29-9011)
Associated Occupation: Health and Safety Engineers, Except Mining Safety Engineers and

Inspectors (17-2111)

Compare Knowledge
Compare Skills
Compare Abilities
Compare Detailed Work Activities
Compare Tools and Technologies

<<	Focus occupation element is much lower
<	Focus occupation element is lower
0	Focus occupation element is at a similar level
>	Focus occupation element is at a higher level
>>	Focus occupation element is at a much higher level

Knowledge

Similarity of Focus Occupation to Associated Occupation: 77

Focus Occupation: Occupational Health and Safety Specialists (29-9011)

Associated Occupation: Health and Safety Engineers, Except Mining Safety Engineers and Inspectors (17-2111)

Associated Occupation's Key Knowledge Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating		Evaluation of Focus Occupation	
Engineering and Technology	5.7	18.9	12.9	<<	Extensive education and/or training may be required	
Design	5.2	15.9	7.1	<<	Extensive education and/or training may be required	
Mathematics	9.2	15.1	14.0	0	Current knowledge level may be sufficient	
Physics	4.3	14.1	11.6	<	Expanded education and/or training may be required	
Public Safety and Security	6.9	14.0	15.2	0	Current knowledge level may be sufficient	
Chemistry	4.8	13.0	14.8	>	Current knowledge level is likely sufficient	
Law and Government	5.9	12.4	13.2	0	Current knowledge level may be sufficient	
Building and Construction	4.0	10.3	8.2	<	Expanded education and/or training may be required	

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Skills

Similarity of Focus Occupation to Associated Occupation: 89

Focus Occupation: Occupational Health and Safety Specialists (29-9011)

Associated Occupation: Health and Safety Engineers, Except Mining Safety Engineers and Inspectors (17-2111)

Associated Occupation's Key Skills Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating	Evaluation of Focus Occupation		
Critical Thinking	10.8	14.4	13.2	0	Current skill level may be sufficient	
Science	4.5	12.4	8.3	<<	Extensive development of skills in this area may be required	
Operations Analysis	5.0	11.0	8.7	<	A higher skill level may be required	
Systems Analysis	6.5	10.6	10.6	0	Current skill level may be sufficient	

Systems Evaluation	6.4	10.5	10.6	0	Current skill level may be sufficient		
Technology Design	2.6	5.8	3.9	<<	Extensive development of skills in this area may be required		

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Abilities

Similarity of Focus Occupation to Associated Occupation: 98

Focus Occupation: Occupational Health and Safety Specialists (29-9011)

Associated Occupation: Health and Safety Engineers, Except Mining Safety Engineers and Inspectors (17-2111)

Associated Occupation's Key Abilities Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating	Evaluation of Focus Occupation		
Problem Sensitivity	11.1	15.3	16.1	0	Current ability level may be sufficient	
Inductive Reasoning	10.2	14.3	13.2	0	Current ability level may be sufficient	
Deductive Reasoning	10.6	14.1	13.3	0	Current ability level may be sufficient	
Written Comprehension	11.0	14.1	12.9	0	Current ability level may be sufficient	
Written Expression	9.8	13.4	12.9	0	Current ability level may be sufficient	
Near Vision	11.1	12.7	11.1	<	Some improvement in abilities may be required	
Information Ordering	9.9	11.9	10.8	<	Some improvement in abilities may be required	
Fluency of Ideas	7.6	11.0	9.6	<	Some improvement in abilities may be required	
Flexibility of Closure	7.8	10.9	10.8	0	Current ability level may be sufficient	
Far Vision	7.8	10.2	10.7	0	Current ability level may be sufficient	
Speed of Closure	5.9	8.2	8.2	Current ability level may be sufficient		

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Activities that Both Occupations Have in Common

Similarity of Focus Occupation to Associated Occupation: 98

Focus Occupation: Occupational Health and Safety Specialists (29-9011) Associated Occupation: Health and Safety Engineers, Except Mining Safety Engineers and Inspectors (17-2111)

Work Activities	Exclusivity of Activity
Analyze effectiveness of safety systems or procedures	87
Communicate technical information	4
Conduct evaluations of worker exposure to radiation or noise	95
Develop safety regulations	74
Evaluate manufacturing or processing systems	68
Follow safe waste disposal procedures	50
Inspect facilities or equipment for regulatory compliance	51
Interpret employee's medical evaluations	92
Perform safety inspections in industrial, manufacturing or repair setting	32

Prepare safety reports	60
Prepare technical reports or related documentation	22
Recommend measures to ensure maximum employee protection	99
Test air quality, noise, temperature, or radiation	82
Understand engineering data or reports	48
Use chemical testing or analysis procedures	54
Use hazardous materials information	35
Use knowledge of materials testing procedures	70
Use pollution control techniques	62
Use scientific research methodology	21

Not all positions in these occupations will necessarily perform all of the listed activities. The exclusivity rating is an indication of how unique the activity is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations engage in that activity.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Tools and Technologies that Both Occupations Have in Common

Similarity of Focus
Occupation to Associated
Occupation: 78

Focus Occupation: Occupational Health and Safety Specialists (29-9011)
Associated Occupation: Health and Safety Engineers, Except Mining Safety Engineers and Inspectors (17-2111)

Tools and Technologies		Exclusivity
Chemical evaluation instruments and supplies	$\exists \llbracket$	10
Computers	$\Box [$	1
Content authoring and editing software	$\Box [$	1
Data management and query software	$\Box [$	1
Electrochemical measuring instruments and accessories	$\Box [$	9
Fluid mechanics equipment	$\Box [$	11
Gas analyzers and monitors	$\Box [$	10
Indicating and recording instruments	$\Box [$	2
Industry specific software	$\Box [$	1
Light and wave generating and measuring equipment	$\exists I$	4
Liquid and gas flow measuring and observing instruments	$\exists I$	15
Metals and metallurgy and structural materials testing instruments	$\exists I$	15
Non destructive examination equipment	$\exists I$	13
Pressure measuring and control instruments	$\exists I$	10
Pulmonary function testing and treatment products	$\exists I$	24
Sampling equipment	$\exists \llbracket$	12
Spectroscopic equipment	$\exists I$	10
Temperature and heat measuring instruments	$\Box \llbracket$	6

Not all positions in these occupations will necessarily use all of the listed tools and technologies. The exclusivity rating is an indication of how unique the tool or technology is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations use that tool or technology.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.